

MEMORANDUM

DATE:	July 4 th , 2016
FROM:	Eric Lancaster
SUBJECT:	Weekly Progress Report @ Gold King
TO:	Kerry Guy

Project: Gold King Interim Water Treatment Plant (IWTP)

Reporting Period: June 27 – July 4

Location: Gladstone, Colorado

Report No.: 26

Prepared for: Emergency Response Unit – US EPA Region 8

I. General Operations Summary:

IWTS Function/Upsets

- Over the reporting period (6/27/16 – 7/4/16 inclusive) Alexco treated 5.00 million gallons at an average flow rate of 496 gpm.
- Over the last few weeks, TSS levels coming into the IWTP have increased, causing occasional spikes at the discharge as measured by the turbidimeter and requiring higher flow rates to the bags and occasional flushing of the clarifier.
- Since early May, lime consumption has drastically increased due to lower pH levels from the mine. A sample at Pond 1 inlet on 6/29 measured 3.2.
- Because of the higher TSS loading, the Phase II clarifier is currently in operation.

Communication System Function Status

- No issues – reliable operations during the reporting period.

Facility or System Related Work, including Repairs & Completions

- ER has removed all sludge from dewatering cells A and B. Cell A has been relined and additional bags have been placed and are back in operation.
- Lange Containment relined Line Cell B on Tuesday, June 28th.
- Summit Mechanical repaired the 12" HDPE discharge line on Tuesday, June 28th.
- Low pH water caused the butterfly valves at the inlet to the reactor tank to be eaten away. On Wednesday, June 22nd, the valves were replaced with 8" SS gate valves. At that time, a 1" thick build-up of sludge was found within the 8" HDPE pipeline that convey water from Pond II to the IWTP. Badger jetted the 8" HDPE pipes between the IWTP and Pond 2 on Wednesday, June 29th.

II. Identified Problems, Causes, and Solutions (Planned or Implemented)

- **Spring Melt Contingency Updates:**
 - **IWTP** – With both clarifiers in operation, the system has been removing 95% - 99% of the required metals (Al, Cd, Cu, Fe, & Zn).

III. System Inspections – Specific elements inspected and finding

- N/A

IV. Site Status

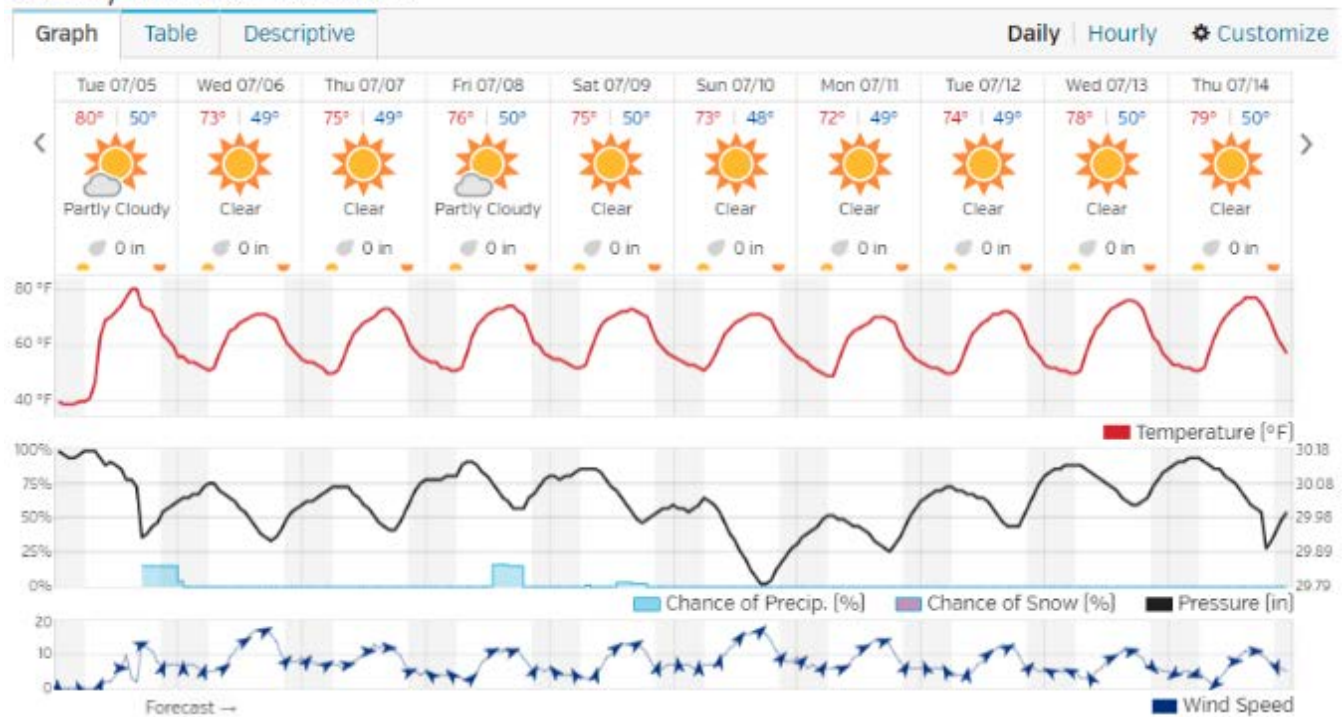
Personnel and equipment onsite

- Alexco currently employs one full-time employee (FTE) who lives in Silverton and oversees all operations at the Gold King IWTP. He is supported by remote operators in Denver, and local sub-contractors as needed.

Weather conditions

- Weather Underground Report for Silverton, CO (7/05/2016 – 7/14/2016)

10-Day Weather Forecast



Pictures from Site



Photo 1: Lange Containment re-lining Cell B - Taken on 6/28/2016



Photo 2: Build-up within the 8" HDPE pipeline – Taken on 6/29/2016



Photo 3: Bags in Cells A and B – Taken on 6/30/2016